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## Patent Abstracts of Japan

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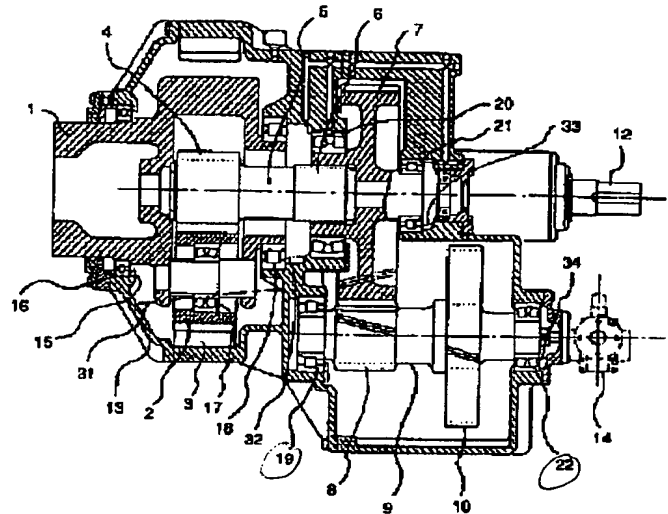
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APPLICANT : HITACHI LTD;

INVENTOR : AGATA HIROSHI;

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TITLE : STEP UP GEAR FOR WINDMILL



ABSTRACT : PROBLEM TO BE SOLVED: To provide a step up gear for a windmill to prevent a bearing from damage even when a shaft is rotated in an unlubricated state.

SOLUTION: A step up gear for a windmill comprises a gear train consisting a low speed stage, a middle speed stage, and a high speed stage; an input shaft 1 supporting the gear train; an intermediate shaft 19; an output shaft 12; a case 13 to support the whole of the members described above; and an oil pump 14 arranged at the shaft end of the intermediate shaft 9. A weir 15 is arranged at the bearing support part of the case 13 and lubrication oil is reserved between rollers of a bearing 16 and a retainer.

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